Department of Defense
Human Factors Engineering
Technical Advisory Group
Meeting 56

November 6-9 2006

Host:

Naval Postgraduate School
Monterey, CA

Meeting Theme

Realizing the Potential of Human Systems Integration

This meeting of the DoD HFE TAG will focus on practical application of Human Systems Integration (HSI), emphasizing the critical role HSI plays in balancing the affordability and capability of Military and other Government Agency procured systems.

A range of instructions across the various member groups of the HFE TAG emphasize the critical role HSI plays in product development and have mapped their definitions of HSI to reflect specific requirements. Regardless of institutional definition, fundamentally, HSI emphasizes the dual approaches of optimizing total system performance and minimizing total ownership cost of systems to achieve this goal. Functionally, this approach extends far beyond traditional human factors for system design, to include a synthesis between a range of relevant domains. For example, DoDI 5000.2 defines Human Systems Integration as a process by which system design is informed by consideration of the human users throughout the system development lifecycle including: (1) Human Factors Engineering, (2) Personnel, (3) Habitability, (4), Manpower, (5) Training, (6), Environment, Safety and Occupational Health (ESOH), and (7) Survivability.

The success of this approach however, will depend on first realizing that the key participants in this process-Military, Government, Industry and Academia have separate yet intersecting roles and working to identify methods for aligning these positions. The goal of TAG 56 is to provide a unique forum for participants from these domains and associated service-wide Enterprises to discuss Human Systems Integration, Human Performance and Human Performance Assessment processes and requirements. Specific topics to be addressed throughout TAG 56 will include:

- Approaches for determining requirements (i.e. Gap analysis)
- Applications of HSI to key domains such as Logistics, Manpower and Personnel, Testing and Evaluation and Medical
- Case studies/examples of HSI applications
- Discussions of tools and approaches for implementing effective HSI strategies, including government to industry guidance.
- State of the art of S&T in relevant HSI domains (HFE, Personnel, Habitability, Manpower, Training, ESOOH and Survivability) existent within military, government, industry and academia
- Analysis of the ‘economics’ of HSI-Cost/Benefit, Return on Investment and related indices of success. Critical emphasis should be placed on defining and quantifying the cost of not considering HSI, with attendant negative results (fatalities, mishaps, etc.)

As Human Systems Integration practitioners, it is our mission to adapt new technologies and processes for use by human operators to maximize effectiveness while lowering training, ESOH and manpower burdens. Human Systems Integration offers a unique approach that can help us to meet these mission goals, but only if implemented in a way that optimizes the abilities of, and lowers the burdens on our most important asset – the human user, operator and maintainer.

PROGRAM SUMMARY

Department of Defense
Human Factors Engineering Technical Advisory Group
Meeting 56: 6 -9 November 2006 Monterey, CA

Monday 6 November

0830 - 1000	Executive Committee meeting
1000 - 1100	New member orientation
1100 - 1300	Luncheon Break
1300 - 1700	Plenary Session
1800 - 2000	Poster session
1800 - 2000	TAG Mixer

Tuesday 7 November

0730 - 0830	Technical Society/Industry
0830 - 1100	Human Factors Standardization
0830 - 1100	User-Computer Interaction
0830 - 1430	Human Factors in Training
0930 - 1000	Networking, coffee
1100 - 1300	Luncheon Break
1230 - 1430	Controls and Displays
1230 - 1430	Human-Robotic Interaction and Interfaces Special Interest Group
1430 - 1500	Networking, coffee
1500 - 1700	Human Modeling and Simulation
1500 - 1700	System Safety/Health Hazards/Survivability
1700 - 1830	Service Caucuses & TS/I Meetings

Wednesday 8 November

0830 - 1100	Design: Tools and Techniques
0830 - 1100	Human Factors in Extreme Environments
0930 - 1000	Networking, coffee
1100 - 1230	Luncheon Break
1230 - 1430	Personnel Selection and Classification
1230 - 1430	Human Factors Engineering/Human Systems Integration: Management and Applications
1230 - 1700	Human Factors Test and Evaluation
1430 - 1500	Networking, coffee
1500 - 1700	Workload and Stress
1700 - 1800	Mission Centric Human Performance Measurement Interest Group
1830 - 2130	Social

Thursday 9 November

0800 - 1000	Operating Board
1000 - 1130	Additional SubTAG meetings or Special Interest Group or Tour
1130 - 1300	Luncheon Break
1030 - 1200	Tour

The Sustained/Continuous Operations subTAG will not convene at TAG-56.

SESSIONS

MONDAY, 6 NOVEMBER *(meeting rooms are subject to change)*

Executive Committee – **0830 – 1000 - Point Cabrillo**

New Member Orientation – **1000 – 1100 - Point Cabrillo**

Plenary – **1300 – 1700 - Point Cabrillo**

1300 Welcome - Mr. Adrian Salinas, DoD HFE Chair

1310 Welcome and Command Overview - Capt (ret) Jeff Kline, Senior Lecturer of Operations Research, Naval Postgraduate School, Monterey, CA

1330 TBA - Mr. Rick Etheridge, Chief of Naval Operations (OPNAV) N125, Branch Director, Human Performance and Systems Acquisition Branch, Arlington, VA

1400 TBA - Dr. Rick Drawbaugh, Air Force

1430 Break

1500 TBA - Dr. John Warner, Army

1530 TBA - Dr. Dane Russo, NASA

1600 TBA - Mr. Glenn Hewitt, FAA

1630 TBA - Dr. Jennifer Narkivicious,

1700 Wrap up

Poster Session – **1800 – 2000 - Point Alones**

TAG Mixer – **1800 – 2000 - Pre-function area outside Captain's Table**

TUESDAY, 7 NOVEMBER - *Election Day - Please absentee vote!*

Technical Society/Industry – **0730 – 0830**

Human Factors Standardization – **0830 – 1100**

User-Computer Interaction - **0830 – 1100**

Human Factors in Training - **0830 – 1430**

- Welcome & Session Overview- John E. Stewart, ARI, And Danielle C. Merket, NAVAIR
- Do Motion Bases Contribute To The Training Effectiveness Of Army Helicopter Simulators? - Michael E. Mccauley, Ph.D., Naval Postgraduate School
- The Effectiveness Of A PC-Based C-130 Crew Resource Management Aircrew Training Device - Robert T. Nullmeyer, Ph.D., U.S. Air Force Research Laboratory, Aircrew Training Research Division.
- Operational Definitions Of Situation Awareness And Situation Understanding Research - Larry L. Meliza, Ph.D., And John S. Barnett, Ph.D., U.S. Army Research Institute (ARI) Simulator Systems Research Unit.
- Validating Team Performance Assessment In Simulation-Based Training Systems - Paul H. Radtke, Joan H. Johnston, Ph.D. And Dennis A. Vincenzi, Ph.D., Human Systems Research & Engineering NAVAIR Orlando Training Systems Division.
- Using A Virtual Reality Display For Mission Training In An Urban Setting - Elizabeth K. Bowman, Ph.D., U.S. Army Research Laboratory, Human Research And Engineering Directorate
- Train To Qualify: Crew Ready For Tasking As Well As The Ship - Barbara L. Wilper, Human Performance Center Det. NAVSEA 03, Washington Navy Yard
- Where Science Meets Tradition: The Research Psychologist As Change Agent - John E. Stewart, Ph.D., U.S. Army Research Institute (ARI) Rotary-Wing Aviation Research Unit

Networking/Coffee - **0930 – 1000**

Luncheon Break - **1100 – 1230**

Controls and Displays - **1230 – 1430**

- Human Supervisory Control and Human Systems Integration - Ms. Sylvain Bruni, Massachusetts Institute of Technology, Department of Aeronautics and Astronautics, Humans and Automation Laboratory, MIT, MA
- Applications of New Technologies to Displays for Navy Diving and Special Operations - Mr. Ron Honaker, Naval Surface Warfare Center, Panama City, FL
- Modulare Adaptive Interface Suite (MAIS) - Sean L. Guarino, Senior Software Engineer, Charles River Analytics, Cognitive Systems, Cambridge, MA
- Human-Guided Algorithms UAV Mission Planning - Laura Major Forest, C.S. Draper Laboratory, Cambridge, MA
- Evaluation of Unmanned Vehicle Mission Management Display - Mr. Chris Voorheis, ARINC, Panama City, FL
- Trade-Offs, Costs and Benefits of Unmanned Systems: What is the Impact of Autonoomous, Unmanned Systems on Human Performance? - Ms. Yvonne Masakowski, Naval Undersea Warfare Center, Newport, RI
- Audio Displays - Mr. Dennis Folds, Georgia Tech Research Institute, Atlanta, GA

Human-Robotic Interaction Interfaces Special Interest Group - **1230 – 1430**

- Organization: Discuss the TAG Interest Group Charter, Groups purpose and goals.
- Identification of Key Players: Who/what organizations need to be included in the group, as either primary or secondary participants.
- Discuss competing meetings and groups that are related and relevant to our intent. Discuss mechanisms for liaison with external groups.
- Each laboratory that is involved with this effort: Identify an individual who can provide a program brief (overview) of your work in this area. The brief should also be used to highlight what your perspective is on current issues/challenges in your work. The intent was to get everyone's perspective out there, to sort of baseline the work in the area, and to identify common problems and issues that could be used to shape future meetings/agenda. Please provide the name of the briefer and the amount of time you would like to brief.

Invited Government Only session. Please contact TAG coordinator with questions.

Human Modeling and Simulation – **1500 – 1700**

System Safety/Health Hazards/Survivability – **1500 – 1700**

Technical Society/Industry - **1700 – 1830**

Army Caucus - **1700 – 1830**

Air Force Caucus - **1700 – 1830**

Navy Caucus - **1700 – 1830**

WEDNESDAY, 8 NOVEMBER

Design: Tools and Techniques – **0830 – 1100**

- HCI Design Patterns Collaborative Portal - Glenn Osga, Ph.D., Business Area Manager, User-Centered Design Code 2461, Space & Naval Warfare Systems Center, San Diego, CA, and Terry Stanard, Ph.D., Research Psychologist, Air Force Research Laboratory, Human Effectiveness Directorate, Wright Patterson AFB, OH.
- The Role of Checklists in Emergency and Abnormal Situations - Barbara Burian, Ph.D., San Jose State University at NASA Ames Research Center, CA.
- SALUTE- AP: A Method for Evaluating Situation Awareness in Tactical Field Experiments - Jeffrey Thomas, Researcher, and Elizabeth Bowman, Ph.D., Research Psychologist, U.S. Army Research Laboratory, Human Research and Engineering Directorate, Aberdeen Proving Grounds, MD.
- The Post Flight Data Collection System - A Human Factors Data Collection, Analysis, and Reporting System Currently in Use With (5) Navy Fleet Squadrons - Sheldon Hunt, Program Manager/PFDCS Analyst, Helmet Fire, Inc., Seattle, WA.
- Methods for Collecting Warfighter Performance and Subjective Feedback: Case Study Highlights from the JTRS-HMS Program - Pam Savage-Knepshield, Ph.D., Research Psychologist, U.S. Army Research Laboratory, Human Research and Engineering Directorate, Fort Monmouth, NJ.

Human Factors in Extreme Environments - **0830 – 1430**

Networking/Coffee - **0930 – 1000**

Personnel Selection and Classification- **1230 - 1430**

Human Factors Engineering/Human Systems Integration: Management and Applications **- 1230 – 1430**

- A Human-Automation Interface Model to Guide Automation Design of System Functions - Joshua S. Kennedy, Human Factors/Systems Engineer, US Army Research Lab (AMCOM Field Element) Redstone Arsenal, AL
  A major component of the US Army's Future Combat Systems (FCS) will be a fleet of eight different manned ground vehicles (MGV). There are promises that 'advanced automation' will take on many of the tasks formerly performed by soldiers in legacy vehicle systems. However, the current approach to automation design does not relieve the soldier-operator of tasks; rather, it changes the role of the soldiers and the work they must do, often in ways unintended and unanticipated. This presentation proposes a coherent, top-down, overarching approach to the design of a human-automation interaction model.

- Human Systems Integration (HSI) in Department of Defense (DoD) and U.S. Navy Acquisition Processes - Ronald E. Honaker, Human Factors Engineer, Human Systems Integration & Engineering (HSI&E) Team, U.S. Navy, Naval Surface Warfare Center - Panama City, FL.
  Underpinning the procurement of any ship, system, tool, or thing ("material") in the Department of Defense (DoD) is entry into, and the processing through, the Defense Acquisition Management Framework. This presentation will begin with an overview of The Joint Capabilities Integration and Development System (JCIDS) and the Defense Acquisition System, including the phases of an acquisition program, mandated activities from each system, and key milestone decision points and transition documents. The presentation will then focus in on specific HSI activities, inputs, and documentation necessary to drive the capabilities-requirements into an acquisition that creates a measurable improvement in warfighters' mission capability. Finally, the presentation will outline U.S. Navy-specific HSI mandates and activities, including independent review of an acquisition program's HSI activities at each critical milestone.

- Application of Design Structure Matrix to Unmanned Aircraft Systems: A Methodology for Representing and Analyzing HSI Relationships - John J. Burns, PhD., NAVAIR Orlando, Training Systems Division, Orlando, FL.
  Over the past decade, Unmanned Aircraft Systems (UAS) have become an integral part of the United States military. The Joint Services - Integrated Product Team (JIPT) was established in order to ensure DoD and other government agencies' UAS can gain access to the National Air Space (NAS) as the need to perform operational and training missions increases. Recognizing that people are part of these unmanned systems, the JIPT has identified Human Systems Integration (HSI) as a critical component of the Systems Engineering Integration Team (SEIT). One of the immediate challenges faced by the JIPT is that of representing and analyzing the complex interplay of HSI domain issues. Design Structure Matrix is a technique for representing complex systems and their relationships in a concise and visual manner. The DSM tool facilitates process modeling, integration, and synchronization as well. This presentation will provide an overview of the HSI challenge faced by the JIPT, a brief description of the DSM tool, and a description of how the tool is being used to organize data from the different HSI domains within the UAS problem space.

- Measuring Human Cognitive Performance - James Buxton, Electrical Engineer, Human Systems Integration Team, US Army Aberdeen Test Center, APG, MD.
  To evaluate total system performance of Future Combat Systems (FCS) and Network Centric Warfare (NCW) technologies, considerable advances in instrumentation, metrics, methodologies, facilities, test procedures, data management, and analysis techniques are required. The US Army Aberdeen Test Center (ATC) has undertaken several efforts to address these challenges. One such effort is the development of human cognitive performance instrumentation that can be worn by the Warfighter in realistic operational test and evaluation

(T&E) environments. This presentation will discuss the development, verification and intended use of advanced physiological and neurological sensors for collecting human cognitive performance data.

- Modeling Stress under Dynamic Conditions - Lesia L. Crumpton-Young, Ph.D, Professor & Co-Director NSF I/UCRC in e-Design, Dept. of Industrial Engr.& Mgmt Systems, University of Central Florida, Orlando, FL.
  Stress can be defined as the mental, physical, and emotional response of humans to stressors encountered in their personal or professional environment. Stressors are introduced in various activities, especially those found in dynamic task conditions when multiple task requirements must be performed. There are two categories of stressors: processive stressors and systemic stressors. The presence of these stressors in the individuals' environment has direct and indirect affects on the body. The goal of this research is to develop a model that will quantify the stress level based on the body's response to stressors introduced under dynamic task conditions.

Human Factors Test and Evaluation –**1230 - 1700**

Workload and Stress –**1500 - 1700**

- Welcome and Opening Remarks - Patton, D.J., Army Research Laboratory, Human Research and Engineering Directorate
- Deployment readiness: A psychological approach - Lyons, J., Fulbright, T., & Behymer, K., Air Force Research Laboratory,Wright- Patterson AFB
- Operator Performance in Remotely Piloted Aircraft (OP-REPAIR): Effects of Shift Work and Sustained Operations - Tvaryanas, A., Thompson, W., Lopez, N., Hickey, P., DaLuz, C., & Caldwell, L., Brooks City Base, TX
- MIR: Workload and Stress -- Lessons Learned - Dudley-Rowley, M., Ph.D., Advanced Projects Branch, NASA-Ames Research Center
- Stress, Fatigue and Workload: Determining the Combined Effect on HumanPerformance - Mock, J., NASA Orbiter Project Office
- The Total Body fatigue Estimator: A State- of- the- Art Software Tool - Crumpton-Young, L., Ph.D., Lamia, Cori, & McCauley-Bell, P. Ph.D., University of Central Florida
- Quantitiative Electroencephalographic Changes Under Continuous Wakefulness and with Fatigue Countermeasures: Implications for Sustaining Operator Performance - Cardillo, C. & Russo, M.D., United States Army Aerospace Research Laboratory
- Psychomotor Testing of the Effects of Sleep Deprivation - Rosenthal, T.J., Catesby Ware, J., Freeman, J., Park, G.D., Guiber, M.R., & Wade Allen, R., Systems Technology, Inc.
- HFE Implications of Stabilzation and Reconstruction Operations - Sciarretta, A., CNS Technologies

Mission Performance Measurement Interest Group –**1700 - 1800**

SALUTE AP: A Method for Measuring Situation Awareness in Tactical Field Experiments - Elizabeth K. Bowman, Army Research Laboratory, Human Research and Engineering Directorate, Building 459, APG, MD 21005, 410-278-5920, DSN 298, ebowman@arl.army.mil

SYNOPSIS: Situation awareness (SA) is a critical capability for effective decision making. In the Army's Future Combat System (FCS), SA will be derived from a variety of unmanned sensor systems and vehicles. While the use of unmanned systems promises to extend human intelligence capabilities on the battlefield, the use of these systems extracts a cognitive cost to Soldiers. The measurement of SA in field experiments is challenging. We developed a survey method based on the Army SALUTE report and included two additional categories to address the full range of SA.

This new format is called the SALUTE-AP (Size, Activity, Location, Uniform, Time, Equipment – Assessment, Prediction). Initial evaluation of this new format suggests that administration and scoring times are significantly reduced while the recording of ground truth is improved. The results of this analysis suggest that the SALUTE-AP instrument was useful for measuring SA at the platoon level while it was easy and unobtrusive to administer. Minimal Soldier training was required for the tool because of their familiarity with the SALUTE format. This tool is recommended for future use and is appropriate for tactical experiments.

Social – **1830 – 2130**

THURSDAY, 9 NOVEMBER

Operating Board – **0800 – 0930**

Tour – **1030-1200**

EXECUTIVE COMMITTEE

Chair (Air Force)	Mr. Adrian Salinas	(210) 536-4428 adrian.salinas@brooks.af.mil
Vice Chair (Army)	Ms. Katrina Baker	(410) 278-3472 Katrina.baker@atc.army.mil
Immediate Past Chair (Army)	Ms. Maureen Bergondy-Wilhelm	(407) 380-4777 DSN 960 maureen.bergondy@navy.mil
Army Representative	Dr. Pamela Savage-Knepshield	(732) 427-3854 DSN 987 psavageknepshield@arl.army.mil
Navy Representative	LCDR Joseph Cohn	(202) 404-8624 cohn@itd.nrl.navy.mil
Air Force Representative	Mr. Darren Cole	(661) 275-0171 darren.cole@edwards.af.mil l
NASA Representative	Ms. Faith Chandler	(202) 358-0411 fchandle@hq.nasa.gov
FAA Representative	Dr. Thomas McCloy	(202) 267-7167 tom.mccloy@faa.gov
TAG Coordinator	Ms. Sheryl Cosing	(703) 925-9791 scosing@comcast.net

SUBTAG CHAIRS

Controls and Displays	Ms. Marianne Paulsen	(850) 235-5527 Marianne.paulsen@navy.mil
	Mr. Justin Kingsford	(540) 653-2508 Justin.kingsford@navy.mil
Design: Tools and Techniques	Dr. Pamela Savage-Knepshield	(732) 427-3854 DSN 987 psavageknepshield@arl.army.mil
	Mr. Joseph Barretta	(410) 278-4172 Joseph.barretta@atc.army.mil
Human Factors Engineering / Human Systems Integration: Management and Applications	Ms. Katrina Baker	(410) 278-3472 Katrina.baker@atc.army.mil
	Mr. Brad Collie	(850) 234-4744 bradley.collie@navy.mil
Human Factors in Extreme Environments	Ms. Mihriban Whitmore	(281) 244-1004 Mihriban.whitmore-1@nasa.gov
Human Factors in Training	Dr. John Stewart	(334) 255-9109 DSN 558 John.stewart@rucker.army.mil
	Ms. Danielle Merket	(407) 380-4792 DSN 960 Danielle.merket@navy.mil

Human Factors Standardization	Mr. David Britton	(937) 255-2030 DSN 785 david.britton@wpafb.af.mil
Human Factors Test and Evaluation	Mr. Darren Cole	(661) 275-0171 darren.cole@edwards.af.mil
	Mr. John Rice	(757) 282-5546 x3802 ricej@cotf.navy.mil
Human Modeling and Simulation	LT Jeff Grubb	(301) 342-9284 Jeff.grubb@navy.mil
Personnel Selection and Classification	LT Tatana Olson	(850) 452-2257 ext 1090 tmolson@nomi.navy.mil
	Dr. Raymond King	(405) 408-5216 Skyking321@aol.com
Sustained/Continuous Operations	Dr. Thomas Nesthus	(405) 954-6297 tom.nesthus@faa.gov
	LCDR Walter Carr	(301) 435-5144 carrw@nidcd.nih.gov
System Safety/Health Hazards/Survivability	Mr. George Murnyak	(410) 436-2925 DSN 584 George.mrnyak@amedd.army.mil
	Ms. Barbara Palmer	(937) 781-2803 Palmer_barbara@bah.com
Technical Society/Industry	Dr. Jennifer Narkivicious	(301) 904-3631 jnarkevicius@jeniussolutions.com
User-Computer Interaction	LT Nausheen Momen	(850) 452-3668 pnmomen@kent.edu
	Mr. Stephen Merriman	(972) 994-6419 Stephen.c.merriman@boeing.com
Workload and Stress	Ms. Debra Patton	(410) 278-5890 DSN 298 dpatton@arl.army.mil
Mission Centric Human Performance Measurement Interest Group	Mr. John Rice	(757) 282-5546 x3802 ricej@cotf.navy.mil

ABSTRACTS

If you are presenting at the plenary session, please bring your half page summary for inclusion in the Minutes or send it to the TAG Coordinator in advance. If you are presenting in a subTAG session, please send your summary to the subTAG chair of the session in which you are presenting.

GENERAL GUIDELINES

Font: 11 or 12 point type, Arial font. Margins: 1.0 inch left, right, top and bottom.

Submission: Electronic format is preferred: PC-readable disk or e-mail in Word format. If that is not possible, submit hardcopy that meets all the format requirements.

Do not include classified, acquisition sensitive, or proprietary information.
You may wish to have your sponsor's approval before briefing at the TAG. The summaries will be included in Minutes published on the TAG website.

SESSION ABSTRACTS FORMAT

TITLE: Full presentation title.

PRESENTER: Name, title, organization, complete mailing address, phone number, DSN (if applicable), email (optional). Separate with commas on two or three lines to leave as much space for narrative as possible.

SYNOPSIS: Narrative. Briefing slides will not be published. Address all important points of your presentation in a succinct manner. Abstracts should be no longer than one-half page (4.25 inches in height or 25 lines maximum). Note general format above.

<u>For presentations discussing results of research and applications:</u>
Concentrate on completed research or interim results which have not been previously reported at the TAG. Include a general statement to orient the reader to the problem under study, the findings, and the recommendations.

<u>For presentations discussing programs in progress:</u>
Acquaint others with on-going work, so we may know what others are doing. Mention participating individuals, phone numbers, organizations, and the portion of work each is addressing so they may be contacted for more information. Mention joint-service participation and dual-use technologies. If the program is producing a product, mention what it will do; and identify the intended user community.

General Information

ATTENDANCE POLICIES

Attendance at the **DoD HFE TAG** is open to:

- US Military/Government employees
- Official technical society/industrial association representatives
- Employees of National Laboratories or Federally contracted research centers
- Specifically invited plenary presenters/guests
- Students majoring in human factors and related disciplines

All others must have a written invitation to attend. Contact the TAG Coordinator for additional information.

ACCOMMODATIONS

A block of rooms has been reserved for the TAG at the Beach Resort Monterey:

Cutoff date: 17 October 2006
TAG rates: single $95
double $125 Oceanside rooms are an extra $40 per night, subject to availability.

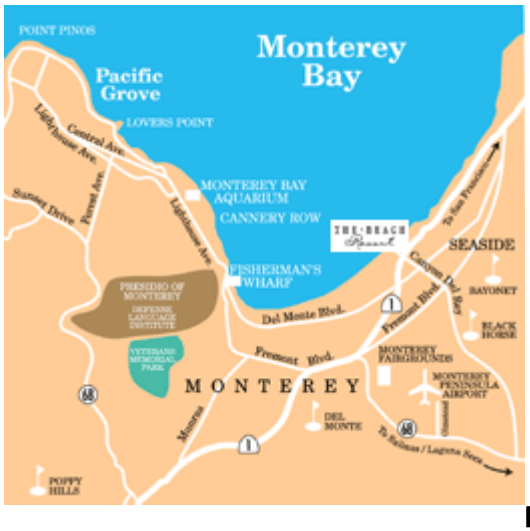
The above rates are exclusive of tax. The current taxes are 10.5% room/night.

Check-in: 1600 hours Check out: 1200 hours

Reservations: (831) 394-3321 or (800) 242-8627. You must use our group code DOD-HFETAG.

DO NOT MAKE YOUR RESERVATIONS ONLINE AS YOUR RESERVATION WILL NOT BE ASSOCIATED WITH OUR GROUP. NO BOQ ARRANGEMENTS IN THE MONTEREY AREA HAVE BEEN MADE FOR THE TAG.

TRANSPORTATION



From the north take Highway 101 south (towards Los Angeles). Remain on Highway 101 south and exit on the Monterey Peninsula Exit - Highway 156. Highway 156 will become Highway 1. Continue on approximately 18 miles south on Highway 1. Exit from Highway 1 at Highway 218 - Seaside / Del Rey Oaks Exit. THE • BEACH *Resort* is located right on the beach just off Highway 1.

The hotel is 3 miles from Monterey Peninsula airport. For more information, visit the hotel's website at http://www.montereybeachhotel.com/location.html

REGISTRATION

Registration can be done online at the TAG web site: http://hfetag.dtic.mil/register.html or by submitting the registration form in this packet.

Please remember that you must be register and be badged before attending any SubTAG/Plenary session.

Registration Desk is open	Monday	1100 – 1430
	Tuesday	0800 – 1430
	Wednesday	0800 – 0830
	Thursday	0800 – 0830

PAYMENT

Credit card: *The TAG accepts payment for registration by credit card using PayPal only. The online registration form must be used in order to accept a credit card payment. CREDIT CARDS ARE NOT ACCEPTED ON-SITE.*

Checks or money orders: Are accepted. Purchase orders are not accepted. Please do not mail cash. Enclose payment with the registration form, or send separately if registering online.

No registrations will be accepted after 27 October 2006. If you are unsure whether you will be able to attend the meeting and this deadline presents a problem, call the TAG Coordinator.

Fees:

Regular registration	$100.00
Special student fee (**applies to full-time students only**)	$ 5.00
Social - per person (optional)	$50.00

PAPER RECEIPTS WILL BE GIVEN TO ALL REGISTRANTS AT ON-SITE REGISTRATION.

FUNCTIONS

Social: In honor of Monterey's 10th Annual Great Wine Escape Weekend, on Wednesday, November 8th, we'll venture to Tarpy's Roadhouse to sample local wines and enjoy heavy hors d'oeuvres. The wines will be provided by Ventana Vineyards whose staff will pour the wines and provide information on Monterey County wine country, answers to questions regarding wine making, wine appreciation, sensory evaluation, wine and food pairing**. This function should be paid for out of pocket. You can pay by check through the mail or online through paypal with a personal credit card.**

Tour: On Thursday, 9 November the Naval Postgraduate School will host a tour of their facilities. Transportation will be provided.

MISCELLANEOUS

Travel Orders: All technical meetings will be held at the conference hotel. For networking purposes and for meeting changes/updates, it is desirable that you stay at the conference hotel.

Clearances: All briefings are unclassified: no clearances are necessary for U.S. citizens for any of the scheduled meetings.

Military Dress: Check with your Service Representative. Navy dress will be khakis.

Abstracts: Presenters at any of the sessions should provide a summary of their presentation to their subtag chair prior to the meeting for inclusion in the Minutes of the meeting. An electronic version is preferred. For format and detailed instructions, refer to the Abstracts section of this packet.

New Members: If you are new to the TAG, you should plan to attend the new member orientation session on Monday, 6 November 2006 from 1000-1100 hours. New attendees are also encouraged to participate in their specific caucus meetings.

Caucus Meetings: If you work for one of the military services (uniform or civilian), you should plan to attend your service caucus meeting. These meetings are intended to provide you with the opportunity to participate in TAG decisions and discussions concerning service-specific issues.

Materials Storage: The Beach Resort Monterey will accept small packages for storage at no cost. Label the items:

ATTN: DoD HFE TAG/S. COSING
Beach Resort Monterey
2600 Sand Dunes Drive
Monterey, CA 93940

DEPARTMENT OF DEFENSE
HUMAN FACTORS ENGINEERING
TECHNICAL ADVISORY GROUP (TAG)
Meeting 56: 6-10 November 2006

REGISTRATION

Use this form or register online: http://hfetag.dtic.mil/register.html

1. Mailing Information (including military rank or title, ie., Dr., Ms., Mr.):
   Name _____
   Address _____
   _____
   City/State/Zip _____
   Telephone _____ DSN _____ FAX _____
   Email _____

2. Badge Information:
   Name _____
   Organization _____

3. Status (See "Attendance Policies" for information)
   ( ) military/government ( ) GOCO ( ) other _____
   ( ) official (credentialed) TS/I member representing _____

4. If called the week prior to the TAG, do you have a 15-30 minute briefing you could present?
   ( ) plenary session or _____ SubTAG session

5. Wine Tasting on Wednesday, 8 November (guests are welcome). The cost is $50:
   __yes _____no _____# of total attendees (including yourself)

6. Tour on Thursday, 9 of the Naval Postgraduate School (no cost):
   __yes _____no _____# of total attendees (including yourself)

7. Enclose check/money order made out to the **DoD HFE TAG.** Credit card payment must be made via the TAG's online registration form http://hfetag.dtic.mil/meetschl.html:

Regular registration	$100.00	___
Student registration (full time students only)	$ 5.00	___
Wine Tasting	$50.00	___
TOTAL		___

Return this form and payment by 10/20/06 to:

Sheryl Cosing
10822 Crippen Vale Ct.
Reston, VA 20194
Phone (703) 925-9791 FAX (703) 925-9694
scosing@comcast.net
TAG Web Site http://hfetag.dtic.mil